Beijing Oriental Wison Mechanical & Electronic Co., Ltd



IPL beauty machine
OW-C5 USER'S MANUAL

Please read this manual carefully before operating this machine and retain it for future reference.

Attention please!

Before using the machine for the first time.

1. Fill into the machine enough water and check if there is water in the machine anytime when you use it.

2. Switch on and off the machine for 2-3 times. In addition, the interval is 30 seconds.

For your safety

- 1. You must always fill the machine with water before using it, otherwise it could easily get broken.
- 2. The OW-C5 will produce high power and the intense pulsed light or laser could easily cause injury to the body if the operator not using the machine according to this introduction.
- 3.Patient: Well-trained operator and appropriate disposal treatment room is necessary and important. Moreover, the patient should also know the treatment theory and wear the professional protective goggle, protecting eyes from burning except during the RF treatment.
- 4.Operator: It is necessary for the operator to wear professional protective glasses during the treatments, because intense pulsed light may also hurt his/her eyes.
- 5.Treatment room: The room must have clear marking "using intense pulsed light& Laser". Keep reflecting things out of the operating room, such as mirror, watch, jewelry.
- 6.Only an authorized mechanic has the right to do maintenance and repair work on the machine. Especially inside, the device has sensitive and dangerous electronic parts and cooling system.
- 7.Before placing the order, make sure the machine is with the voltage 110V or 220V.
- 8.Maintenance is must after turning off the device, otherwise it's possible to injure people and damage the equipment. When maintained, please close power, cover board, and observe in person.
- 9. Keep IPL handles clean and don't let any cooling gel enter in to the probes. Clean with water and soft paper towels.
- 10.Don't start the machine if you finding slack from treatment head.

If it's on! Turn off the machine and contact maintenance for help.

If in any doubt that something is broken or not working as it should be, turn off the machine and call for maintenance.

- 11. Over light energy could burn skin, which results in atrophy or pigment deposit.
- 12.Do not directly stare at the intensive pulsed light or laser during treatment, even when wearing the protective glasses or goggles.
- 13.Do not point the treatment hand-piece in to the air. Generally, hang it in the bracket of the machine.
- 14. The equipment is a little heavy, so please be careful when moving.
- 15. The temperature will rise after absorbing light energy, so please take actions to reduce flammable risk on treatment parts or around area, such as cold gel or ice cooling.

Cooling gel must always be used on the treatment part!

- 16.Do not use ethanol, acetone or other flammable things on skin before treatment. If necessary, please use soap or water.
- 17. After operating, treatment handles or other parts need to be sterilized in ethanol. Please wait till they dry and then put them away.

Who is forbidden?

- 1.People who are allergic to light.
- 2.Pregnant women, diabetes suffers, cardiac patients, people with hypertension, epilepsy and skin cancer.
- 3. People with cardiac pacemaker and defibrillator.
- 4. People whose treatment parts are damaged.
- 5.People who are just back from the beach. The skin is very weak after the exposure in the sun in this time.
- 6.People who have taken some photosensitive food or drug recently.

Important Information

This user's guide contains important information on the use and operation of this machine. Please read all the information carefully for optimal performance to prevent any damage or misuse of the machine. Any changes or modifications not expressly approved in this user's guide could void your warranty for this equipment.

Accessories



Specification

Power source	1600W
Light source	Intense pulse light
Handle	IPL
Spot size	12*30mm2/15*40mm2/15*50mm2
7 standard filters	430nm/480nm/530nm/560nm/580nm/640nm/690nm
Optional filter	755nm
Operating screen	8.4 inches real color touch screen

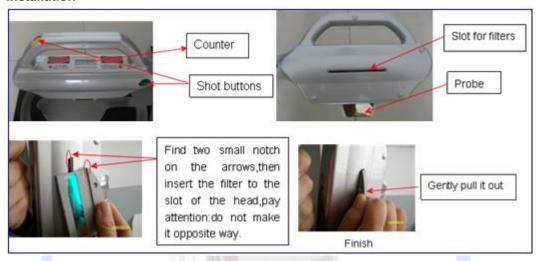
Operating	5 kinds
language	
IPL energy	01-50J/cm2
Pulse duration	1.0-10.0
Pulse delay	05-99ms
Pulse interval	1s, 2s, 3s, 4s
Pulse number	1-6
Cooling system	Semiconductor+ wind+ water+ cooling gel
Input power	AC 220V (110V)/ 15A 50HZ (60HZ)
Machine size	46*32*53cm
Package size	51*37*58cm



IPL Operating

Getting started

Installation



Operation

- 1.Insert the relevant filter to the IPL treatment handle
- 2. Normal watering (pure water or distilled water):

Link the two plastic joints to the machine, Fill the water (about 6liter) through plastic joint until there is water flowing from the plastic joint. (You better put a water container under plastic joint.) After water is filled, leave the plastic joint connected to the machine.

- 2.1 Change the water inside of the machine every 10-15 days if you use the machine very often.
- 2.2 When changing water, just do as described above.
- 2.3 The OW-C5 is equipped with powerful cooling system. After five minute's working, you need to fill the machine with water again until there's a water-spill from the plastic joint again. Warning! Never power the equipment if you haven't filled it with water.
- 2.4 Then turn on the key switch. Observe that there is water circulation inside the device. Normally, you will hear the sound of water flow. The probe runs cold in about 1-2 minutes. If the probe gets very hot in the beginning (like after 10 working seconds) Turn off the machine and then shake the treatment head 3 times over your head. The water of the head will then flow back into water tank. Then start the machine again, and if the probe is still hot, you can just repeat this action.
- 3. Turn now on the IPL controller by pressing the upper screen at the front of the machine, (Picture 1) just press it, and it will light on, and you are able to start for the settings of the machine.



(1)Press the touch SCREEN and click "IPL", and then you will come into the automatic detection as follows. Choose the HAIR REMOVAL treatment (picture 2) and you will come into the operation interface.



Adjust different parameters by touching the different boxes (picture 3).



Technical Parameters

[Count] To count present pulse numbers

[First pulse] To adjust width of first pulse

The range is 1.0-10.0ms. 0.1ms as every unit

[Pulse number] To adjust numbers of treatment pulses. The range is 1-6.Each unit is 1 [Pulse space] To adjust delay between first pulse and sub pulse. The range is 1-4s; each unit

is 1s.The smaller parameters, the higher energy. So the black skin should use the smaller parameters

[IPL] Power of IPL energy, the range is 0-50J/cm2

[Cooling] To adjust the cooling levels of this machine

[Standby] Is the state of stand-by, the treatment handle has no reactions in this state.

[Ready] Is the state of working; the probe of handle will light on at this state.

[Return] back to last interface

There are 3 different settings depending on the skin type the patient has. Here are the initial settings that you preset so it will remain in the memory.

Attention 1:

Black skin absorbs light easily and the deeper color the skin is, the lower parameters are used.

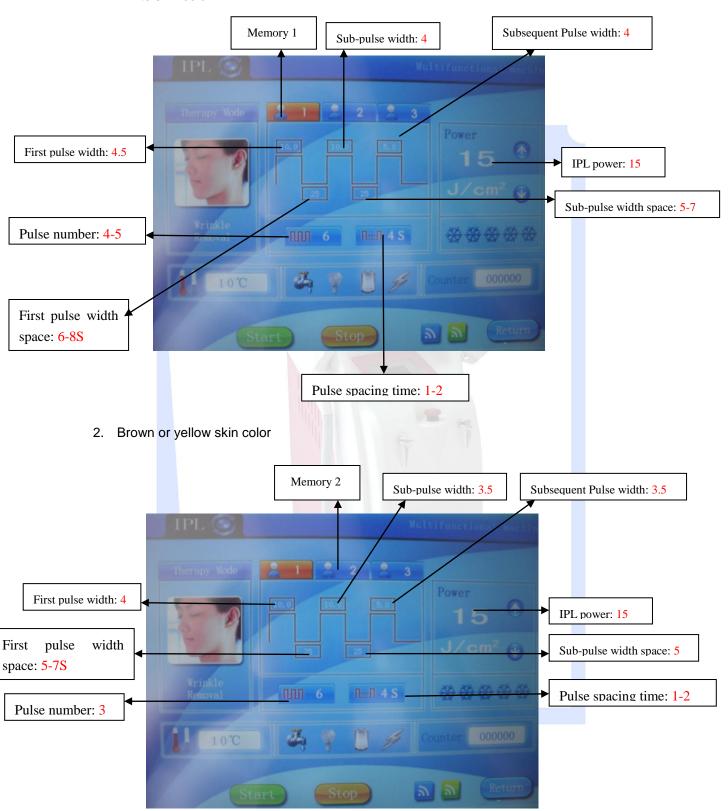
♣ Attention 2:

Black skin absorbs light easily and the deeper color the skin is, the lower parameters are set. You have 3 memory boxes. 1, 2, and 3

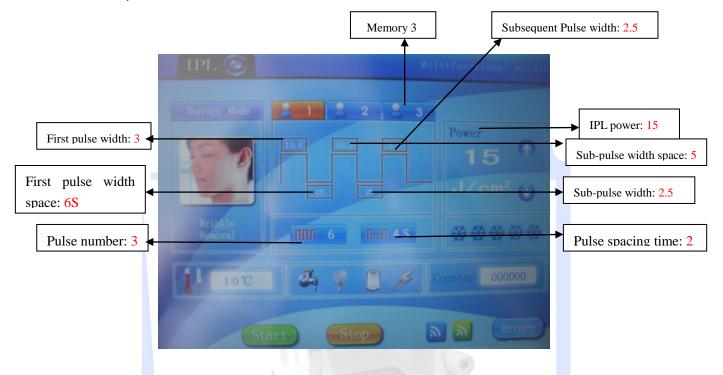


For white, brown and black skin color treatment Setting

1. White skin color



3. Deep or black skin color



The meaning of the parameter

·Wavelength——Provide the target organization to absorb the light energy optionally

•The number of the pulse—The pulse energy of the each intense pulse light can be divided into two, three or five small continuous pulse. This kind of special system can guarantee the target organization fully absorb pulse energy; at the same time, protect the epidermis to spread heat. Multi pulse benefit the deep department in the target organization to keep on heating, avoid harming the non- target organization;

•Pulse width——Shines to the target organization and heats up the uration, the interval between pulse width and the space of each pulse (pulse space) takes millisecond as unit, each pulse width can establish independently. When use three pulses, two pulses space adopt the same setting.

•**Pulse space**—When many pulses are applied for spreading the heat, more shorter the pulse space is, more quickly the skin heats.

Energy density—Total energy shines upon the organization area in unit. The energy density is a unit that measures the total energy shined upon the skin in unit (J/cm2). The operator sets energy density every time. The energy density is composed by the energy (take J as the unit) sent out by choosey pulses and delivered area (take m2 as the unit). The intense light pulse of the EROSE instrument enters the patient's skin through through light lead crystal and congealed gum. Because the light spot area of the IPL instrument is very big(8mm×40mm), The light disperses very small, the light penetrates deeply. The energy density is nearly the same in the different depth under the skin (This differentiation is very big with small light spot of the laser). The bigger the energy density is, the temperature of target hair, the surrounding organization and the epidermises is higher.

Congealed gum and cooling IPL head can lower the initial temperature of epidermis in order to guarantee that the highest temperature attains the target organization. Comparative

lower energy density is an important part of tender skin technique of IPL, also is guarantee of not ceasing work and rest after operation.

It is keen for setting energy density and successfully choosing procedure to observe the reflection of skin In the treatment.

The energy should be increased carefully after observing the reaction of epidermis.



To adjust the cooling levels of this machine

In total there are 5 levels and each snowflake as 1 level. Normally we use 5 levels, as in this way the machine would have best cooling effect.

Start—— Is the state of stand-by, the treatment handle has no reactions in this state.

Then if you want to stop, press "Start" it will be changed "



The technical parameters of operation

*480nm—1200nm, Vascular Therapy, Acne Treatment

*530nm—1200nm, Pigmentation therapy

*640nm—1200nm, Hair Removal

*430nm—1200nm, Acne Treatment

*560nm—1200nm, Skin Rejuvenation

*580nm—1200nm, Vascular Therapy

*690nm—1200nm, dark and thick hair removal

*755nm—1200nm, very dark and thick hair removal

Pay attention: the filters above are optional

Parameter Option

1. Treatment parameter of hair removal:

Complexion	Hair style	Pulse delay	Pulse Num & Pulse width	IPL Energy
undertone	Thin	15ms	3×5ms	21J/cm2
Middle	Thin	25ms	3×5ms	19J/cm2
Deep color	Thin	35ms	3×5ms	17J/cm2
undertone	Normal	15ms	5×4ms	22J/cm2

Middle	Normal	25ms	5×4ms	20J/cm2
Deep color	Normal	35ms	5×4ms	18J/cm2
undertone	Dense	15ms	5×7ms	23J/cm2
Middle	Dense	25ms	5×7ms	22J/cm2
Deep color	Dense	35ms	5×7ms	21J/cm2
undertone	IV	15ms	3×5ms	20J/cm2
Middle	IV	25ms	3×5ms	18J/cm2
Deep color	IV	35ms	3×5ms	15J/cm2

2. Treatment parameter of pigment:

Complexion	The color or style	Pulse delay	Pulse Num & Pulse	IPL Energy
	of focus		width	
undertone	Red color	15ms	2×5ms	21J/cm2
Middle	Red color	25ms	2×5ms	19J/cm2
Deep color	Red color	35ms	2×5ms	18J/cm2
undertone	Red color	15ms	2×5ms	23J/cm2
Middle	Blue color	25ms	2×5ms	22J/cm2
Deep color	Blue color	35ms	2×5ms	21J/cm2

3. Treatment parameter of vascular on face:

Complexion	Style of Vascular	Pulse delay	Pulse Num & Pulse	IPL Energy
			width	
undertone	Thin	15ms	2×5ms	23J/cm2
Middle	Thin	25ms	2×5ms	21J/cm2
Deep color	Thin	35ms	2×5ms	19J/cm2
undertone	Normal	15ms	3×5ms	29J/cm2
Middle	Normal	25ms	3×5ms	27J/cm2
Deep color	Normal	35ms	3×5ms	25J/cm2
undertone	Dense	15ms	5×4ms	30J/cm2
Middle	Dense	25ms	5×4ms	28J/cm2
Deep color	Dense	35ms	5×4ms	26J/cm2

4. Treatment parameter of vascular on legs:

Complexion	Style of Vascular	Pulse delay	Pulse Num & Pulse	IPL Energy
			width	
undertone	Thin	15ms	2×5ms	22J/cm2
Middle	Thin	25ms	2×5ms	20J/cm2
Deep color	Thin	35ms	2×5ms	18J/cm2
undertone	Normal	25ms	3×5ms	24J/cm2
Middle	Normal	35ms	3×5ms	22J/cm2
Deep color	Normal	45ms	3×5ms	21J/cm2
undertone	Dense	25ms	5×4ms	29J/cm2

Middle	Dense	35ms	5×4ms	27J/cm2
Deep color	Dense	45ms	5×4ms	25J/cm2

5. Treatment parameter of photo rejuvenation:

Complexion	Wrinkle	Pulse delay	Pulse Num & Pulse	IPL Energy
			width	
undertone	slender	15ms	5×4ms	22J/cm2
Middle	slender	25ms	5×4ms	20J/cm2
Deep color	slender	35ms	5×4ms	18J/cm2
undertone	patency	15ms	5×6ms	24J/cm2
Middle	patency	25ms	5×6ms	22J/cm2
Deep color	patency	35ms	5×6ms	21J/cm2



Warning! In the first operation you'd better start from the lower power (IPL: 15), and then ask the patients if they feel like a slight tingling or a pinch. If yes, continue to treat; if not, try to increase the parameters gradually...When you do this, just repeat to shot the same treatment area. Usually IPL 25-35

Preoperative preparation

1 Inquiry work

When patient's first visit a doctor, the doctor in charge should:

- 1. Exclude the patient whose skin is black brown because of basking in the sunlight or artificial lights in recent $3\sim4$ weeks
- 2. Exclude the patient who may bask to be black brown in the sunlight or artificial lights in future 3~4 weeks.
- 3. Inquiry patient Of disease history in detail, including what kind of treatment he accepted, judge he or she fit to accept the IPL treatment or not.
 - 4. Make it clear why the patient accept the treatment and what he or she expect.
 - 5. Discuss the plan of IPL skin softer treatment with the patient.

2 Explanation work

First visit to a doctor, the doctor in charge (or other qualified medical personnel) should tell the patient the following circumstance:

- The body may be unwell or ached when curing;
- After the treatment, may be temporarily swollen, inflamed or dropsy;
- To attain the ideal effect usually needs $3\sim5$ times treatment. The whole period is decided according to the concretely curative effect and the patient's actual expectation value;

•Temporarily slight risk of the side effects may exist, such as pigmentation excessiveness and the skin veins change etc

3 Protect the eye

While using the IPL, all personnel (include the patient and all medical personnel) must wear the protection glasses to protect eyes. Patient also may cover up the eye with the gauze. Certainly, best protection measure is to let patient shut up eyes.

4 Anesthesia

During the IPL rejuvenation, using the pulse light with the low energy density do not need anesthesia. But a lot of patients use the local anesthesia to avoid any unwell feeling in cure process. Generally use 4% lidocaine facial cream as the local anesthesia but not use the anaesthesia of EMLA (Eutectic mixture of local anesthetics) which causes the vice- reaction of the blood vessel constringency and will lower the treatment result. Generally after using anaesthetic one hour, carry on the treatment, but wipe off all anaesthetic before treatment.

5 Take a picture

Take a picture for the patient before and after operation (left, right and front side), because many patients can't objectively evaluate the treatment headway, these photographs can be the powerful proof.

Taking pictures should be under the same environment as similar speed, guide number and focus in order to objectively contrast photographs in different time.

❖ Vice- reaction

The whole IPL skin softer process needs $3\sim5$ times, the interval time for each time is three weeks. The treatment can improve skin gradually. We can guarantee that the patient does not need to cease work and rest at the same time. The vice- reaction temporarily risk may exist, vice- reaction performances are follows:

1 Ache

When the pulse light is sent out, some patients may feel unwell in different degree. Some patients say that it likes the pinprick; some say that it likes to be flipped by the rubber. The feeling of cauterization may keep at most one hour. The adult and bigger child can suffer this kind of unwell feeling and some patients request the local anesthesia.

2 Break the natural veins of skin

Possible scab or water pimple maybe left but disappear in $5\sim15$ days.

3 Pigmentation change

In the treatment area possibly has the pigmentation change, most appear pigmentation or shortage (appear on the fuscous skin or when the treatment area suffers the sunlight irradiation). To some patients, the inattention protecting from light after operation may cause the pigmentation exceed, this kind of change usually will restore to original in $3\sim6$ months, but the pigmentation change is very few.

After several days in treatment of IPL for tender skin, the freckle and birthmarks will appear the circumstances that color deepen generally, but will disappear basically in the short date.

4 Scar formation

This treatment seldom produce scar, in very few cases, the big area increases the scar formation or the abnormality of scar proliferation organization. For reducing the risk of forming scar after operation, please follow the postoperative nursing elucidation.

5 Swollen and inflamed excessiveness

After operation, the nose or the skin of the cheeks easily temporarily red and swollen, usually decrease within $3\sim7$ days.

6 Skin flimsiness

The treatment area or the nearby skin may become weak, please do not cover at this time, do not rub the treatment area in order to prevent the skin avulsion.

7 Bluish swelling on skin

Treatment area may appear blue or purple tumefaction on skin, it may keep $5\sim15$ days, the bluish may change into red ferruginous, will fade away in $1\sim3$ months

- Let the patient sit in cure chair wearing the protection glasses, remind that the patient do not open the eye in the surgical operation process. The operator selects the best position between the face of patient and the touch screen.
- The treatment usually starts from inconspicuous part of the face, such as the forepart of ear. Spreading congealed gum for the 2~3mm on curing part will help cool off the skin and promote penetrative rate of pulse. When the light pulse shoot at congealed glue, each part which accept the light pulse treatment should spread the new congealed gum.

- Place the treatment head perpendicularly on congealed glue of $2\sim3$ mm thick, make the light lead crystal to get in touch with congealed gum, not skin.
 - Press to move the trigger switch, shoot the light pulse.

(The choice of parameter is very important for clinic training. The short pulse mainly used for the undertone skin or the red face. The long pulse width and long pulse intermission mainly used for the deeper skin type and patient whose pigment pathological changes or sunlight burn. We suggest the doctor carefully choose the parameters. If meeting difficult case, consult clinical expert.

- In cure process, when the patient need additional treatment for further consultation with a doctor, increase the energy density properly for better effect. Before starting cure, still need to shoot the test light spot for observation.
- After treatment, do not need any after treatment nursing. The patient can dive into the work or life right away. Anti-sunburn process is needed for treatment area. The appropriate skin nursing can enhance the intense pulse light to smooth the related color regiment, shrink the pore size, and reduce the pigment sink and light aging.
- After treatment, the color of pigmentation and brown spot will deepen, but will disappear in several days.

After operation nursing

1 Summarize

The blain and the ulcer on skin after treatment can be cured by the antibiotic ointment or the burn ointment. The low-density ointment can reduce tumidness. If the blain is scabby, keep it wet with the Vaseline etc.

2 Sunlight isolation

One month after operation, patient should protect treatment area from being shined with some medical. The sunlight may improve the rebirth rate of the melanin, thus cause excessiveness of the pigmentation.

3 Face-painting

Most doctors allow the patient to use the cosmetic immediately after operation. But they request patient to inform them once detecting the area of treatment appears wound or scab and stop Face-painting.

The risk of the low energy IPL light tender skin surgery is very low, the patient can work or live right away.

4 Continue to treat

The following is the suggestion as reference for doctors that the relevant patient continues

to cure.

Patient should return to the hospital for further consultation 3 weeks after a period of treatment($4\sim$ 6times), and may as well keep the long-term treatment, because some case need one year for recovering.

5 Vice- reaction

If discovering any vice-reaction in cure process, stop curing until the vice- reaction of treatment part disappeared, and then checks the reason.

- Immediately clear the Congealed gum, clean irradiation area with rinsing.
- •Refrigerate the irradiation area with ice bag for at least 15 minutes until the hot sensation disappears.
 - The typical phenomenon may appear:
 - ——Slightly flaming feeling may go on half an hour or so;
 - ——Flush slightly,4~12 hours, generally can fade away in a day;
 - ——Freckle may deepen slightly, generally shed in the week gradually;
- —-The freckle may become deep after irradiation for a short tine, but will become light gradually;
- ——For the irradiation to chloasma, do not appear too obvious instant reaction of skin in order to prevent the vice-reaction of the pigmentation.
- Avoid using hot water, use the cold water to clean the skin mildly. Cosmetics for keeping wet also can be used.
 - Purpuric skin , blain, dropsy
- —Can use the ointment ease the reaction, use the BFGF to promote skin to restore in later period. (Be dealt with as light degree injury)
 - Pigmentation
- —When appearing in the person with black skin or who suffer insolation, use the BFGF or the liquid of the vitamin C or beautiful and white nursing to reduce it.
 - The decrease or lost of pigment
- —May have something to do with the high energy irradiation, can recover generally by oneself:
- —The guest who adopt the IPL rejuvenation is not allowed to use the stimulating cosmetics or hormone in order to avoid producing the pigmentation.

6 End the treatment

When to end the treatment is decided by the doctor. Generally when the red spot on the surface of skin, the extension of capillary vessel and pigmentation obviously decrease; When the texture, roseate degree of skin, the sunlight burn and light aging improve obviously, end the treatment.

7 After operation skin nursing

Morning — Use the mildly neutral detergent and cold boiled water to clean the skin — Spread the vitamin C compositive cream. — Spread the suntan cream Night — Clean the skin — Spread cream keeping wet.

❖ Machine Maintenance

- 1. No stress on the Screen, prevent from breaking up
- 2. Keep the filters and probe clean, do not let the cooling gel enter into probe.
- 3. The handle is fragile, please take care when pick up and dropped it in the bracket.
- 4. Every 15 days to change the water. After changing water, please make sure water circulate normally before usage. If the probe continues being in high temperature after continuing working too long. You could change half of water from the machine. In this case, the temperature will reduce at once.
- 5. To keep the powerful energy, we suggest you change the water after 3000 shots.
- 6. Please check the surface of treatment head if there's attachment object after treatment, if so; please lightly clean it with lens paper or absolute alcohol.



Beijing Oriental Wison Mechanical & Electronic Co. Ltd

Tel: 0086-10-81518268 Fax: 0086-10-81533136

Three Year Warranty

DATE: 2013-1-29

(From 2013-1-29 to 2016-1-28)

This is to certify that all the machines manufactured by Beijing Oriental Wison Mechanical & Electronic Co. Ltd. are warranted by following terms:

- 1. Within guarantee period (3 years) we provide free fittings. Such as those consumable fittings like water pipe, foot pedal, eye patch.
- 2. As for some big problems, such as power source and screen controller are broken, if the fails cannot be repaired, we will change a new machine.
- 3. As for problems with accessories, such as handles, we shall be responsible for the change and freight. If they are man-made destroys, the customer should undertake the cost of both accessories and freight.
- 4. As for repair of the machine, within 3 years, if the machine needs to be sent back for repair, we will be responsible for repair, including the changes of accessories; both of them are free of charge (not including xenon lamp). And we will be responsible for the freight of sending back.
- 5. As for term 2-4, customers have responsibility to provide video or photos of the broken machine or accessories, so that our engineer can give suitable suggestions to solve the problem properly.
- 6. 3 year later we offer to repair the machine. The repaired parts will be charged.
- 7. We are not responsible for man-made destroys. Such as no circulation of water (which causes lamp burnt) or dropping the handles on floor (which breaks some parts).
- 8. If the buyer has any questions from our technical department, we will give you great technical support.

Buyer Contacting Information:

Beijing Oriental Wison Mechanical & Electronic Co. Ltd Date: 2013-1-29